Clostridium difficile Prevention Strategies
A Review of Our Experience

Suzanne R. Anders, MHI, RN
Director, Hospital Patient Safety
Health Services Advisory Group (HSAG)
February 26, 2015
What is a Quality Innovation Network-Quality Improvement Organization (QIN-QIO)?

- Funded by the Centers for Medicare & Medicaid Services (CMS)
- Tasked with implementing the National Quality Strategy
  - Safer care
  - Ensure patient and family engagement
  - Support coordination of care
  - Advocate for disease prevention
  - Promote best practices of healthy living
  - Make care affordable
QIN-QIO Areas of Focus

- Cardiac Health
- Disparities in Diabetes
- Healthcare-Associated Conditions in Nursing Homes
- Chronic Disease Management Through Meaningful Use
- Value-Based Payment Program
- Healthcare-Associated Infections in Hospitals
- Coordination of Care

Patient is at the center of care.
About HSAG

• Committed to improving quality of healthcare for more than 35 years
• Provides quality expertise to those who deliver care and those who receive care
• Engages healthcare providers, stakeholders, Medicare patients, families, and caregivers
• Provides technical assistance, convenes learning and action networks, and analyzes data for improvement
About HSAG (cont.)

Nearly 25 percent of the nation’s Medicare beneficiaries

HSAG is the QIN-QIO for California, Ohio, Arizona, Florida, and the U.S. Virgin Islands.
During This Presentation We Will…

1. Identify effective strategies to reduce *Clostridium difficile* infections (CDIs).
2. Describe the value of a thorough CDI assessment.
3. Review adjuncts to NHSN data collection for CDI reduction.
Which Middle Circle Looks Bigger?

A

B
Are the Lines Parallel or Do They Slope?

Which One is Tallest?

Which Middle Circle Looks Bigger?

A

B
How Accurate Were You?

• Did preconceived beliefs affect your decision?
• What was the impact of another person’s opinion?
• How is this applicable to your work?
Improvement Process Outline

- Assessment
- Recommendations
- Implementation Plan
- Evidence-Based Interventions
- Investigation and Monthly Reporting
- Monitoring Results
- Celebrating Mentors
Assessment
What is the Purpose of an Assessment?

- Identifies disparities between national guidelines and actual practice
- Exposes variations in practices
- Confirms perceptions
- Uncovers behaviors not previously known
- Provides actionable data
- Detects the need for additional information
What Factors are Important in Conducting an Effective Assessment?

- Sensitivity to shared information
- Knowledgeable about guidelines and recommendations
- Unbiased interviews
- Ruthlessly objective observations
- Respectful of an individual's knowledge, skills, and experiences
What is the Assessment Process?

**Review**
- Processes and policies
- Meeting minutes
- Documentation

**Interview**
- Individuals who are the most knowledgeable
- Individuals who can affect change

**Observe**
- Use the observation bundle
- Walk around unit to look for contact isolation
What are the Assessment Domains?

- Physicians
- C-Suite
- Data
- Processes
- Team Activities
Recommendations
<table>
<thead>
<tr>
<th><strong>OBSERVATION</strong></th>
<th><strong>RECOMMENDATION</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>C-SUITE</strong></td>
<td>No consistent process to ensure patients/family members are included to prevent HAIs.</td>
</tr>
<tr>
<td>Inform patients/family members about HAI risk, prevention, and hospital policies to empower them as partners in care.</td>
<td></td>
</tr>
<tr>
<td><strong>DATA</strong></td>
<td>Data results and reports do not include benchmarks.</td>
</tr>
<tr>
<td>Use data to create a sense of urgency including a review of comparative data, patterns, and trends.</td>
<td></td>
</tr>
<tr>
<td><strong>PHYSICIANS</strong></td>
<td>Physicians lack a process to hold peers accountable for HAI reduction efforts.</td>
</tr>
<tr>
<td>Develop a process of accountability that can be shared for medical staff approval (e.g., displaying data that identifies individual physicians).</td>
<td></td>
</tr>
<tr>
<td><strong>PROCESSES</strong></td>
<td>Staff report breaking the seal of urinary catheters in order to attach urine meters.</td>
</tr>
<tr>
<td>Collect (direct observation) baseline data to identify trends and patterns in line maintenance.</td>
<td></td>
</tr>
<tr>
<td><strong>TEAM ACTIVITIES</strong></td>
<td>There is no formal process for team recommendations and results to be consistently communicated to bedside care providers.</td>
</tr>
<tr>
<td>Establish a process to ensure team meeting activities are regularly shared with bedside care providers.</td>
<td></td>
</tr>
</tbody>
</table>

What is the evidence to support these recommendations?
<table>
<thead>
<tr>
<th>RECOMMENDATION</th>
<th>EVIDENCE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Inform patients/family members about HAI risk, prevention, and hospital policies to empower them as partners in care.</td>
<td>Provide educational materials for patients and family members, that include explanations of CDI, why contact precautions are necessary, and the importance of hand hygiene. <em>Strategies to Prevent Clostridium difficile Infections in Acute Care Hospitals: 2014 Update</em></td>
</tr>
<tr>
<td>Establish a process to ensure team meeting activities are regularly shared with bedside care providers.</td>
<td>Feedback to all healthcare staff is critical for the success of any evaluation program. Unit-based recognition of achievement of low CLABSI rates or the length of time between CLABSI events is a useful method to encourage staff involvement. <em>Strategies to Prevent Central Line-Associated Bloodstream Infections in Acute Care Hospitals: 2014 Update</em></td>
</tr>
</tbody>
</table>
Implementation Plan
Create a Written Plan

• Should be created collaboratively

• Should include:
  – Outcome and interim goals that are SMART (Specific, Measurable, Achievable, Realistic, and Timely)
  – Metrics
  – Who does what by when
No written plan is available. Expect slow progress (or none at all). Enter at your own risk.
Evidence-Based Interventions
Why Take an Evidence-Based Approach?

- Based on proven results
- Assists with standardization
- Provides opportunities for comparison
- Community practice
What Are Some Sources to Gather Evidence?

National, Peer-Reviewed Journals

Regulatory Agencies

Subject-Matter Experts

Tip: Consider the rigor used to collect the evidence.
Investigation and Monthly Reporting
Who, What, and When: ICP

• Identify the infection as soon as possible
• Complete preliminary information
• Assist with identifying trends and patterns
• Act as a subject-matter expert
• Report data monthly and ensure that it is meaningful and relevant
Who, What, and When: Nursing

• Identify the individuals caring for the patient
• Determine factors that may have led to the infection
• Collaborate with the ICP to problem solve solutions
• Trial interventions
• Keep the next patient safe
Monitoring Results
What is Monitoring?

• Tracking the success (or shortcomings) of interventions
• Being aware of potential pitfalls

Not enough data

Only collect data that is relevant

VS

Too much data
Celebrate Mentors
Recognize High Performers

• Often overlooked
• Needs to be timely
• Intrinsic or extrinsic
Improvement Process Outline

- Assessment
- Recommendations
- Implementation Plan
- Evidence-Based Interventions
- Investigation and Monthly Reporting
- Monitoring Results
- Celebrating Mentors
Strategies

- Infrastructure
- Prevent exposure to *Clostridium difficile* spores
- Reduce the risk once the patient encounters spores

Image credit: David Goulding, Wellcome Trust Sanger Institute, Wellcome Images
Infrastructure

- ICP expertise
- Ability to identify CDI patients
- Patient room assignments
- Laboratory-based alert process
Prevent Exposure

- Dedicated equipment
- Contact isolation
- Hand hygiene
- Decontamination of room
- Educate team members
Pharmacy Elements

Leadership
Accountability
Expertise
Action
Tracking
Reporting
Education
What Not to Do

• Test patients without signs or symptoms
• Repeat testing
• Treat patients on antibiotics as potential CDI patients
Unresolved Issues

• Contact isolation by family members
• Standing orders
• Alert system to identify patients with recurrent CDIs
• Restricting the use of gastric acid suppressants
• Prescribing probiotics
Monitoring

Compliance with:

- Environmental cleaning
- Contact precautions
- Hand hygiene
Common Characteristics: High Performers

- Support and encourage transparency
- Engage executive leadership, physicians, and clinical leaders
- Willing to invest resources (people and materials) to resolve the problem
- Use evidence-based interventions supported by national guidelines and associations
Common Characteristics: Non-high Performers

• Assign the responsibility of infection reduction programs to the infection control department
• Lack of senior leadership engagement with the initiative
• Are not likely to hold nurses or physicians accountable for their practices
• Are not likely to invest in the resources needed for HAI reduction
Lessons Learned

• Without constant vigilance, hospitals do not stay on track to improve.
• Written implementation plans and infection investigations are not automatically completed.
• Lack of improvement, or an upward trend in the number of infections, requires immediate attention.
Take Home Messages

• Use data to drive change
• Verify perceptions
• Do not “hide your light under a bushel”
Thank you!

Suzanne R. Anders, MHI, RN
818.265.4675
sanders@hsag.com
This material was prepared by Health Services Advisory Group, the Medicare Quality Improvement Organization for California, under contract with the Centers for Medicare & Medicaid Services (CMS), an agency of the U.S. Department of Health and Human Services. The contents presented do not necessarily reflect CMS policy. Publication No. CA-11SOW-C1-02252015-01